DOCUMENT RESUME

ED 419 782 SP 037 946

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TITLE	An International Comparative Study of Teacher Satisfaction, Motivation, and Health: Australia, England, and New Zealand.
PUB DATE	1998-04-13
NOTE	18p.; Paper presented at the Annual Meeting of the American Educational Research Association (San Diego, CA, April 13-17, 1998).
PUB TYPE	Reports - Research (143) -- Speeches/Meeting Papers (150)
EDRS PRICE	MF01/PC01 Plus Postage.
DESCRIPTORS	*Administrator Attitudes; Elementary Secondary Education; Foreign Countries; International Studies; *Job Satisfaction; *Stress Variables; Tables (Data); *Teacher Attitudes; Teachers
IDENTIFIERS	Australia; England; New Zealand

ABSTRACT

This paper presents the findings of a three-way comparison of teachers and school administrators in Australia, England, and New Zealand. The Teacher 2000 Project examined teachers' feelings about and reactions to teaching. Researchers used a seven section, self-report questionnaire that included items on demographics, orientation to teaching, satisfaction/dissatisfaction with teaching, time devoted to teaching tasks, commitment to teaching, and mental stress. There also was an open ended question for making comments about teaching. A total of 5,722 surveys were sent to elementary and secondary level public school teachers and administrators in Australia, England, and New Zealand. There were 892 Australian respondents, 543 English respondents, and 565 New Zealand respondents. Data analysis indicated that there was significant commonality in the sources and strength of teacher and administrator satisfaction and dissatisfaction, commitment and orientation to teaching, and mental stress (though there were some contextual differences between countries). Teachers from all three countries keenly felt: the influences of educational change; increased social, academic, and administrative responsibilities for schools; increased community criticism; and lower teacher status. Teachers and administrators also found their core business of facilitating student learning and their professional self-growth to be highly satisfying. (Contains 6 tables and 15 references.) (SM).

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ED 419 782

AMERICAN EDUCATIONAL RESEARCH ASSOCIATION

ANNUAL MEETING

1998

SAN DIEGO

April 13-17th

AN INTERNATIONAL COMPARATIVE STUDY OF TEACHER SATISFACTION, MOTIVATION AND HEALTH:

AUSTRALIA, ENGLAND AND NEW ZEALAND

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AERA
Annual Meeting 1998,
April 13-17th
San Diego

AN INTERNATIONAL COMPARATIVE STUDY OF TEACHER SATISFACTION, MOTIVATION AND HEALTH: AUSTRALIA, ENGLAND AND NEW ZEALAND

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ABSTRACT

This paper presents the preliminary findings of a three way comparison of 2000 teachers and school executive in Australia, New Zealand and England.

The study sought to examine and benchmark teacher satisfaction, orientation to teaching, motivation and commitment, and mental stress in the three countries, and to further develop a model of teacher satisfaction derived from the earlier Australian phase of the project.

Preliminary results of the three nation comparative study are presented and some implications explored. While there are some contextual variations in results for the three countries, these are overshadowed by the high degree of commonality in the sources and strength of teacher and executive satisfaction and dissatisfaction, commitment and orientation to teaching, and mental stress experienced by those sampled in the study.

The influences of educational change, increased social, academic and administrative responsibilities for schools, increased community criticism and lower teacher status, all appear to be keenly felt by teachers in each of the three countries. However, teachers and executive also found their 'core business' of facilitating student learning and their professional self-growth to be highly satisfying.

BACKGROUND TO THE STUDY UNDER DISCUSSION

Educational systems, schools and teachers in many countries have been under similar pressures and have experienced similar change over the past three decades. The 'effective schools movement', the 'school reform movement', the movement towards local governance and the 'self-managing' school, and more recent attempts to restructure educational bureaucracies have all been well documented.

Accompanying these movements or waves of change have been increases in the administrative, academic and social expectations placed on teachers and schools, an 'overcrowding' of school curricula, greater stakeholder intervention in education and its general politicisation, greater criticism of schools and teachers, and downward pressure on teacher status. There have been concerns raised over the standard of

those being attracted to teaching, the deprofessionalisation of the role, the increasing feminisation of the profession and the ageing teaching population.

It seems while the pressures and expectations on schools have never been higher, paradoxically, the standing of teachers in society has probably never been lower.

A number of key questions emerge from this context, including those of:

- Why do teachers enter teaching?
- How do teachers feel about teaching?
- How do teachers feel they are regarded by their employer and society generally?
- What aspects of their role do teachers find to be satisfying
- What do teachers find to be dissatisfying?
- Are satisfaction levels changing?
- Is teacher pre-service and in-service training adequate to meet the needs of today's and tomorrow's teachers?
- How are teachers coping with change and the pressures being placed upon them?

THE PRESENT STUDY: THE TEACHER 2000 PROJECT

The Teacher 2000 Project arose because of a desire to find answers to the above questions and to benchmark teacher satisfaction levels so that informed decision making could occur. The project sought to extend and test the findings of earlier interview based work involving teacher resignation (Dinham, 1992), the impact of teaching on teachers and their partners (Dinham, 1997), and the manifestations and implications of the ageing teacher population (Dinham, 1996).

The initial Australian phase of the project involved 892 teachers and school executive at 71 government schools in Western Sydney and was completed in 1997 (Dinham & Scott, 1996a; 1996b; 1997a). As a result of interest in this work, replications were launched in 1997 in England through Nottingham-Trent University and in New Zealand through Massey University. A phase has commenced in the USA and negotiations to conduct a further replication in Canada are taking place. This paper reports on preliminary analyses and comparisons of the New Zealand, English and Australian data.

The theoretical framework for the project was provided by the earlier studies mentioned above and the 'two-factor' theory of occupational satisfaction emanating from the work of Herzberg, Mausner and Snyderman (1959), Sergiovanni (1967), and others, which suggested that the factors giving rise to occupational satisfaction are related to, but largely different from those giving rise to occupational dissatisfaction.

The original Australian study sought to test and quantify previous findings and relationships in this area. It was found that there are in fact three broad domains of teacher satisfaction: the 'core business' of teaching (centred on student achievement and personal professional self-growth) which respondents found highly satisfying, the predicted extrinsic aspects of teaching (such as the status of teachers, educational change and social expectations on schools), which respondents found uniformly dissatisfying, and a central domain of satisfaction factors which were either neutral or moderately satisfying/dissatisfying (such as school leadership and decision making factors, school infrastructure, community relations, school reputation, school communication), factors which showed most variance from school

to school with leadership being a key factor in the level of satisfaction experienced within this middle domain (see Dinham & Scott, 1998).

The Teacher 2000 Project sought to achieve the following aims:

1. To build upon and validate understandings of teacher satisfaction, teacher dissatisfaction, orientation to teaching, teachers' values and teacher health revealed by prior research.

2. To develop an instrument suitable for identifying and quantifying the sources and relative strength of factors contributing to teacher satisfaction.

3. To obtain benchmark information on matters relating to teacher welfare which can be used for tracking, explanatory, planning and predictive purposes at school, system, and other levels.

4. Where established instruments are used, to compare the findings of the study with previous research.

METHOD

Instrument

The instrument used was a machine readable self-report questionnaire. Items were mostly pre-coded with some open-ended questions. Minor changes only were made to the Australian version, with wording of satisfaction items made consistent with terminology employed in the English and New Zealand contexts, and questions concerning school type and qualifications suitably modified.

The final instrument contained 7 sections:

1. **Demographic items** - age, years of service, years at present school, sex, current position, qualifications, first language, type of school in which currently teaching.

2. **Orientation to teaching** - participants were asked to rate as true or false seven reasons for their entering teaching and two items about their preparedness to teach.

3. **Satisfaction/dissatisfaction with teaching** - participants used a seven point scale (1 = Highly Dissatisfied - 7 = Highly Satisfied) to rate their satisfaction with 75 aspects of teaching/teachers' work. Participants also used seven point scales to rate their current level of satisfaction with teaching (1 = Highly Dissatisfied - 7 = Highly Satisfied) and the change in their level of satisfaction since they began teaching (1 = Now More Highly Dissatisfied - 7 = Now More Highly Satisfied). Two open-ended questions invited respondents to list other factors which contribute to their satisfaction/dissatisfaction with teaching.

4. **Time devoted to teaching tasks** - respondents were asked to indicate via subdivisions on a pie chart the proportion of their 'professional life' devoted to activities such as preparation for teaching, meetings, face to face teaching, and so on.

5. **The 40 item Commitments Scale** (Novacek & Lazarus, 1990) - was used as a measure of motivation/commitment. Novacek and Lazarus' instrument yields scale scores for six components of commitment - Affiliation, Power and Achievement, Stress Avoidance, Sensation Seeking, Personal Growth, Altruism.

6. **The 12 item form of the General Health Questionnaire** (GHQ) - the GHQ is a widely used and reliable instrument for the assessment of non-psychotic mental distress, or 'stress'.

7. Finally, **an open-ended question** gave respondents the opportunity to make any other comments about teaching.

Data from completed surveys were computer scanned and analysed using SPSS, while open-ended responses were subject to content analysis using NUDIST (QSR, 1994).

Participants

Sampling

Australia

The Metropolitan West Region was one of the largest of the 10 regions in the New South Wales Department of School Education public school system, which in total employs approximately 50,000 teachers [the regional structure was in the process of being removed from the DSE administrative hierarchy at the time the study took place].

Western Sydney was chosen both because of convenience of access and because of its heterogeneity, ranging from small rural primary schools to large urban high schools, and from schools with large proportions of students with languages other than English to schools with negligible numbers of students with this background. Economically, the region covers a wide spectrum, from areas of high and persistent adult and youth unemployment and poverty, to pockets of affluence. In the media, however, the region is usually portrayed as being 'disadvantaged' in comparison with the rest of Sydney.

An invitation to participate in the project was made to over one third of all government schools in the region, ensuring in the selection process a representative sample of schools, given the heterogeneity of the region noted above. Data were collected in three steps, a pilot during which the instrument was tested and a second main data collection step, both of which comprised the first phase of the project (Dinham & Scott, 1996a). In the second phase of the project, responses to the instrument from additional schools were obtained and fuller analysis of the data took place (Dinham & Scott, 1996b; 1997).

Overall, 47 of the region's 185 primary schools, 19 of the 54 secondary schools, and 5 of the region's 16 Schools for Specific Purposes (SSP) took part in the study. One of the region's two field studies centres also was approached, but did not reply to the invitation to participate. Thus, of the 255 public (government) schools in the [then] Metropolitan West Region, 71 participated in the study. In total, 2,336 surveys were distributed.

England

Schools were selected by taking every fifth school appearing in the lists of eight local education authorities (LEAs). The decision was made to over-sample Grant Maintained schools and so all GMS in each LEA area were included. All schools in the Nottingham area which participated in Nottingham-Trent's professional experience program were also included. In all, 661 schools were approached to participate in the research.

Head Teachers (principals) of selected schools were sent a letter outlining the research and inviting their cooperation. Included were a copy of the questionnaire and a consent form to be completed and returned by fax or post. One hundred and fourteen HTs consented to participation. Of these, two were from Brighton-Hove, 12 from Cornwall, 34 from Kent, 12 from Leeds, 12 from Cheshire, two from Tower Hamlets, none from Richmond and 40 from Nottinghamshire. In all, 2,384 questionnaires were posted to participating schools.

The Head Teachers of a sample of schools who had declined participation were contacted to enquire why they had refused. The reason most commonly cited was that the school was soon to have its OFSTED inspection.[1] Other HTs explained that their staff were already too heavily burdened and they, the HTs, did not wish to ask them to commit any more time to work or work related activities.

New Zealand

A stratified, random cluster sample was drawn with the objective of obtaining at least 300 primary and at least 300 secondary teachers. Sampling frames were lists of all state and integrated primary schools (including Intermediate schools); and all state and integrated secondary schools in the southern half of the North Island of New Zealand. Two separate random samplings were carried out, one from each frame. The number of schools was determined by staffing numbers at each school drawn, and sampling was continued until a target of 500 possible respondents was reached in each sector.

Once schools were identified, approaches were be made to arrange a visit by a team member to a regular staff meeting in order to introduce the project and seek the co-operation of the staff. Questionnaires were distributed at the meeting and arrangements made for their return when completed.

Sample Description

Table One: Mean Age, Length of Service and Time in Current School, by Country.

	Age	Service	Current School
Australia	40	15	6
England	42	16	6
New Zealand	42	15	7

[1] The Office for Standards in Education (OFSTED), officially the Office of Her Majesty's Chief Inspector of Schools in England, was set up on 1 September 1992. It is a non-ministerial government department, independent from the Department for Education. One of OFSTED's major tasks has been to set up the new independent system of school inspection defined by the Education (Schools) Act 1992. This provides inspection on a four-year cycle for all schools in England which are wholly or mainly state-funded. [Source: OFSTED web site]

Australia

Of the 2,336 surveys distributed to schools, there were 892 respondents (38%), 65% of whom were women and 35% men. For comparative purposes, in 1989 the Australian teaching force was 61% female and 39% male (Logan, Dempster, Berkeley, Chant, Howell, & Warry, 1990: 1).

The mean age of respondents was 40 years (women = 39, men = 42), with a range of 20 to 66. These means, while lower than the NSW DSE[2] overall, are close to the means for the then Metropolitan West Region which has tended to be younger in profile than more favoured regions such as the North and South Coast.

Of female respondents, 56% were primary trained and 44% high school trained, while 32% of men were primary trained and 68% high school trained. Mean length of service as a teacher was 15 years (range 0 to 37), and mean length of time in current school was 6 years (range 0 to 31).

Including the position of Advanced Skills Teacher[3], 44% of the women were in promotions positions, and 55% of the men (48% of the total sample).

Of the 892 respondents, the great majority (84%), were born in Australia. For comparative purposes, The Australian College of Education (ACE), in a research study on the profile of the Australian teaching service, found that 83% of Australian teachers were born in Australia (Logan, et. al., 1990: 5).

Only 9% of respondents had a first language other than English, while the earlier ACE study found 12% of Australian teachers had this background (Logan, et. al., 1990: 5).

England

Of 2,384 surveys distributed to 114 schools, 543 were returned (23%). Mean age of participants was 42 years (range 25 to 62 years). Mean length of service as a teacher was 16 years (range less than one year to 41 years) and median length of time in current school was 5.5 years (range less than one year to 29 years). Only 4% of the sample reported having a first language other than English.

In all, 70% of participants were women and 30% men, whilst 38% (24% of men, 45% of women) taught in the infants-primary range, 2% in middle schools, 55% in secondary schools (69% of men and 48% of women) and 4% in schools classed as 'other', chiefly special schools (rounding of percentages may mean that figures do not total 100%). Table Two contains the description of participants, by sex and type of school in which they were teaching.

[2] Now the Department of Education and Training (DET).

[3] Introduced in the early 1990s, the AST classification is in the process of being removed from most Australian educational systems, at a time when it appears likely the position will be introduced in England (see Dinham & Scott, 1997b).

Table Two: Percentage Teaching in Each Type of Schools by Country

	Type of School			
	Primary*	Middle	Secondary	Other
Australia	48	N/A	52	N/A
England	38	2	56	4
New Zealand	53	8	37	2

* Includes nursery schools

Eleven percent of participants to the English study were head teachers (13% of men and 9% of women), 7% were deputy heads (8% of men and 7% of women) and 23% were heads of faculties, years or departments (32% of men, 19% of women). A further 25% described themselves as classroom teachers with extra responsibilities and salary (22% of men and 26% of women), 30% as classroom teachers (23% of men and 33% of women), only 1% were supply teacher (no men and 1% of women) whilst 4% described themselves as 'other' (specialists of various sorts including librarians, 3% of men and 4% of women).

Table Three: Percentage of Participants In Different Promotion Positions, by Country.

	Promotion Position				
	HT/ Princ	DHT/ Dep Pr	Mid/low Prom Pos	Class Room	Other
Australia	5	3	35	39	10
England	11	7	48	30	5
New Zealand	8	10	25	47	14

Figures may not total 100 because of rounding of decimals.

New Zealand

A total of 1002 surveys were distributed to 71 schools (56 primary, 15 secondary) with 565 surveys returned (56%). The mean age of the New Zealand participants was 42 years (range 21 to 66), mean length of service 15 years (range less than one year to 45 years) and average service in current school was 7 years (range less than one year to 35 years). Six percent reported having a first language other than English.

Of the 565 participants, 71% were women and 29% were men. Eighteen percent of the men and 4% of the women were school principals (total = 8%), 9% of the men and 10% of the women were deputies (total = 10%), whilst 30% of the men and 23% of the women described themselves as senior teachers or heads of departments (total = 25%). Thirty seven percent of the men and 47% of the women were classroom

teachers (total = 44%), whilst 5% of the sample described themselves as relieving teachers (men = 25, women = 6%) and 9% as 'other' (men = 4%, women = 11%).

Primary school teachers accounted for 53% of the sample (men = 32%, women = 62%), teachers in intermediate schools 8% (men = 7%, women = 8%), secondary teachers 37% (men = 58%, women = 29%) and 2% taught in mixed schools (men 3%, women = 2%).

RESULTS

Motivation

Orientation to Teaching

The associations between country and the seven orientation to teaching and two preparedness for teaching items were explored via chi square tests. Table Four contains the percentages of teachers from each country who agreed with the nine items. Significant associations were found on four orientation to teaching items - 'lack of other options' (χ^2 2 = 6.67, p = .04), 'pressure from my family'(χ^2 2 = 14.58, p = .0007), 'fit with family commitments' (χ^2 2 = 20.33, p = .00004), and 'because of salary' (χ^2 2 = 8.66, p = .01), and one preparedness to teach item, 'realistic view of teaching' (χ^2 2 = 16.72, p = .0002).

Table Four: Orientation to and Preparedness for Teaching, by Country

Aust	Engl	NZ	Item
	% True		
49	45	46	I always wanted to become a teacher
40	40	43	Teaching was not my first choice of career
20	18	24*	I became a teacher because of a lack of other options
13	6	10***	There was pressure from my family to become a teacher
34	31	32	I was attracted to teaching because of the hours and holidays
44	32	40***	I thought that teaching would fit in well with family commitments
10	7	6*	I was attracted to teaching because of the salary
54	65	60***	I had a realistic view of teaching before I began my training
38	39	44	My training adequately prepared me for teaching

* p < .05 ** p < .01 ***< .001

New Zealand teachers (24%) were most likely to agree that they had become teachers because of lack of other options (Australia = 20%, England = 18%). In comparison, Australians (13%) were most likely to report that there was pressure from their families to become a teacher (England = 6%, New Zealand = 10%).

Australians (44%) were also the most likely to agree that they chose teaching because it would fit in well with family commitments although New Zealanders were

considerably more likely to agree than were English teachers (England = 32%, New Zealand = 40%). Australian teachers (10%) were also the most attracted by salary (England = 7%, New Zealand = 6%). English teachers (65%) were most likely to consider that they had a realistic view of teaching before they commenced (Australia = 54%, New Zealand = 60%).

Commitments

Table Five reports the sample means and standard deviations for the six Commitments scales. A MANOVA was performed to explore the association between commitments and country. The multivariate effect was significant ($F_{12,3952} = 3.11$, $p = .000$), however no univariate effects were significant. In cases such as these it is necessary to examine the discriminant function to discover where the differences between groups lie as the differences will be found in the patterns of commitments rather than on single scales.

Table Five: Sample means and Standard Deviations for the Commitments Scales

	Country		
	Australia	**England**	**New Zealand**
Scale			
Affiliation	5.53 (1.04)	5.46 (1.05)	5.54 (1.03)
Altruism	5.39 (.89)	5.34 (.87)	5.44 (.84)
Personal Growth	5.38 (.90)	5.39 (.82)	5.48 (.81)
Stress Avoidance	5.14 (1.03)	5.15 (.97)	5.03 (1.01)
Sensation Seeking	5.12 (1.04)	5.11 (1.02)	5.24 (.99)
Power and Achievement	4.93 (.94)	4.94 (.92)	4.90 (.88)

Interpretation of the discriminant functions revealed that Personal Growth, Sensation Seeking and Stress Avoidance were important for interpreting the differences between the countries. Analysis of the first discriminant function revealed that New Zealand teachers were 'different' and were characterised by the lower contribution of Stress Avoidance and higher contributions of Sensation Seeking, and Personal Growth to their 'scores' on the discriminant function compared to both the Australian and English teachers. Analysis of the second function showed Altruism, Affiliation and Personal Growth to the discriminating variables, with English teachers relatively lower on this function compared to Australians and New Zealanders, the second of whom again scored 'highest'.

Satisfaction

Testing the Model

During the original Australian phase of the research, data reduction was performed on the 75 satisfaction items with the aim of exploring the structure of satisfaction/dissatisfaction and of developing a series of scales to measure these. Exploratory factor analysis of the 75 satisfaction items using LISREL 8 indicated that the model of teacher satisfaction should contain between 7 and 14 factors.

Confirmatory factor analyses indicated that an eight factor model gave the best fit (Root Mean Sq Error of Approximation = 0.047, GFI = .88, AGFI = 0.86).

The eight factors were named (highest loading item with factor loadings included in brackets):

1. *School Leadership, Climate, Decision-Making* (item with the highest loading 'Leadership in your school', .83);
2. *Merit Promotion and Local Hiring* ('The way promotion on merit has occurred in schools', .86);
3. *School Infrastructure* ('Your school's material resources', .66);
4. *School Reputation* ('Reputation of your school in the community', .76);
5. *Status and Image of Teachers* ('Your current salary', .78);
6. *Student Achievement* ('Your capacity to change students' attitudes', .73);
7. *Workload and the Impact of Change* ('Your current workload overall', .69);
8. *Professional Self-growth* ('The degree to which you have achieved your professional goals', .77).

A confirmatory factor analysis was conducted in LISREL 8 to test the degree to which the model of aspects of satisfaction developed in Australia fitted the English and New Zealand data. Fit statistics for the whole model were found to be adequate, and those for six of the eight individual scales were excellent for all three countries. However, statistics and patterns of correlated errors on two scales - Student Achievement and Workload/Impact of Change suggested that each of these might best be further broken down into two scales. Further analysis is proceeding to test this.

Satisfaction Items and Scales.

Table Six presents the means for self rating of overall satisfaction, change in satisfaction and each of the eight aspects of satisfaction scales for the three countries (1 = Highly dissatisfied, 4 = neutral, 7 = Highly satisfied).

Table Six: Means for Satisfaction Scales, by Country.

	Country		
Scale	Australia	England	New Zealand
Overall Satisfact	4.07	3.92	4.25
Change in Satisfac	3.41	3.23	3.66
Leadership	4.27	4.13	4.55
Promotion	3.09	3.65	4.29
Infrastructure	3.69	3.42	4.07
Reputation	4.37	4.61	4.74
Status	2.18	2.35	2.76
Student Achievement	5.03	5.23	5.21
Workload, Change	3.07	2.78	3.33
Self-Growth	5.31	5.25	5.31

Two one way ANOVAs were performed on the overall satisfaction and change of satisfaction scales and both results were significant (overall satisfaction, $F2,1986 = 5.83$, $p = .003$; change in satisfaction $F2,1980 = 7.22$, $p = .0007$).

Bonferroni procedures were also conducted and the significant result for overall satisfaction was accounted for by the difference between the New Zealand (mean = 4.25) and the English teachers (3.92). The significant result for change in satisfaction was accounted for by the New Zealand teachers' higher mean (3.66) compared to both the Australians (3.41) and the English (3.26).

A MANOVA performed on the eight aspects of satisfaction scales yielded a significant result ($F16,3958 = 33.82$, $p = .000$). This was accounted for by significant univariate results on seven of the scales - School Leadership ($F16,3958 = 15.55$, $p = .000$), Promotion ($F16,3958 = 135.26$, $p = .000$), School Infrastructure ($F16,3958 = 45.44$, $p = .000$), School Reputation ($F16,3958 = 24.60$, $p = .000$), Status of Teachers ($F16,3958 = 71.49$, $p = .000$), Student Achievement ($F16,3958 = 10.07$, $p = .000$) and Workload, Change ($F16,3958 = 37.99$, $p = .000$). Again, Bonferroni procedures were performed to test for direction of significant effects.

New Zealand teachers (mean = 4.55) were found to more satisfied than both Australian (4.27) and English teachers (4.14) on School Leadership. On the Promotion scale New Zealanders (4.29) were found again to be more satisfied than the English (3.65) who in turn were also more satisfied than the Australians (3.09). New Zealanders (4.07) were also more satisfied than the Australians (3.69) on School Infrastructure who in turn were more satisfied than the English (3.42). Australians (4.37) were less satisfied than both the New Zealanders (4.74) and the English (4.61) on School Reputation.

Scores on the Status of Teachers scale are probably better expressed as degrees of dissatisfaction as teachers from none of the countries scored above 3. New Zealanders (2.76) were the least dissatisfied, whilst English teachers (2.35) were also less dissatisfied than Australians (2.18).

Least satisfied on the Student Achievement scale were the Australian teachers (5.03), who scored lower than the New Zealanders (5.21), and the English (5.23). Least satisfied with on the Workload, Change scale were the English teachers (2.78) who scored lower than the Australians (3.07) whilst the New Zealand teachers (3.33) were less dissatisfied than both.

The Influence on Mental Well Being - The General Health Questionnaire

A one way ANOVA followed by Bonferroni procedure were performed to test the association between mental well being, as measured by the General Health Questionnaire, and country. A significant result was found ($F2,1988 = 4.04$, $p = .02$) which was accounted for by the higher scores of the English teachers (2.18) compared to both the New Zealanders (2.11) and the Australians (2.11).

DISCUSSION

Introduction: Commonalities Within and Between the Samples

Overall, as predicted from previous research and confirmed by the earlier Australian study, it was found that teachers and those holding promotions positions in schools are most satisfied by matters intrinsic to the role of teaching. Student achievement, helping students to modify their attitudes and behaviour, positive relationships with students and others, self-growth, mastery of professional skills, and feeling part of a

collegial, supportive environment are powerful satisfiers across the three samples. This finding was consistent with the results of the Commitments scale, which revealed that teachers' strongest commitments are to affiliation, altruism and personal growth values.

On the other hand, also as predicted, the major sources of teacher and executive dissatisfaction were matters more extrinsic to the task of teaching children and working with other staff. These dissatisfiers are largely out of the control of teachers and schools, and found within the wider domain of society, governments, and the employing body.

Additionally, the rapid pace and nature of educational change and increased expectations being placed on schools were found to have contributed to the most strongly felt dissatisfiers, which included the community's apparent poor opinion of teachers and their 'easy' working conditions, the apparent negative image of teachers portrayed in the media, the rapid pace of change, the perceived low level of support provided to implement changed policies, procedures, responsibilities and curricula, the lack of support services for teachers, and promotion procedures which many found problematic.

As predicted, the major dissatisfiers were those seen to detract from the facilitation of student achievement and teacher effectiveness, and thus, the 'two factor' theory of teacher satisfaction discussed earlier - whereby the factors giving rise to teacher satisfaction and teacher dissatisfaction are basically discrete - was confirmed.

However, there was a third broad band of factors revealed by the study which previous research had not identified, this third or middle band being comprised of largely school based factors. Falling between the universally perceived intrinsic rewards of teaching such as self-growth and pupil achievement (most satisfying), and the universal extrinsic hindrances to teacher satisfaction and effectiveness such as educational change, the status of teachers and increased workloads (most dissatisfying), are school based factors such as school leadership, climate and decision-making, school reputation, and school infrastructure, and it was these factors where most variation occurred from school to school and where there is therefore greatest potential for change within schools.

Thus, the results for the Commitments scales and the eight satisfaction scales, all strongly suggest that teachers across the three samples are most satisfied with the intrinsic rewards of their own self-growth and facilitating student achievement, somewhat ambivalent about school based factors which, in part, are a product of the leadership and decision-making processes and styles existing in their particular schools and the school's relationship with its local community, and most dissatisfied with the largely extrinsic societal and employer based factors such as the status and image of teachers and imposed educational change.

The Importance of Control at the Three Levels

A key element in the above 'three factor theory' is the notion of 'control'. As noted by Otto (1986) and others (see also Johnson, Stewart, Hall, Fredlund & Theorell, 1996, for a large, recent study), control is an important issue in worker stress and health. All things being equal, matters over which persons perceive they have less control tend to be more dissatisfying and stressful. Obviously, those in schools have little control over extrinsic matters such as the image and status of teachers and educational change. They have a degree of control over school based matters such as leadership and decision making, while teachers have greatest control over their own teaching and professional growth. Overall, it can be argued that teachers and school executive have had less control over their domain than previously over the past

decade or more, as education has become more politicised and various stakeholders have had greater influence, and this could help to explain the decline in satisfaction experienced by the majority of teachers surveyed in all three countries.

Variation Between Teachers in the Three Countries: A Preliminary Discussion

All three countries under examination have experienced similar pressures and changes in recent times, and these are elaborated upon in the reports for each of the three studies available from the respective research teams (see p. 16).

It should be noted that while the sampling procedures varied in each of the three countries, the samples obtained were actually very similar in terms of age, service, time in current school, primary/secondary employment (when middle school and secondary are combined), and sex. Promotion position held is more difficult to compare because of differences in designation in the three countries.

However, despite the strong commonalities in regards to the three samples, and strong similarities in their sources and strength of satisfaction, dissatisfaction and commitment, there are some interesting contextual differences which will be briefly explored below, although a fuller analysis on the data is still to be completed.

New Zealand teachers were more likely to report that they had entered teaching because of a lack of other options, with English teachers least likely to agree with this reason, possibly reflecting the respective range of employment opportunities in the three countries at the time those surveyed entered the profession.

Family pressure to become a teacher was most felt in Australia, whereas less than half this proportion of English teachers gave this as a reason for entering teaching. New Zealanders were closer to Australians on this issue. A possible reason to explain this apparent phenomenon could be that in Australia, and to a lesser degree New Zealand, teaching was a way of improving one's social standing and economic prospects in the post WWII period. Given this reasoning, parents may thus have impressed this on their children. Certainly, in the earlier interview study of teachers (Dinham, 1992), for many teachers and their families teaching was the only way to obtain a tertiary education and, at the time those interviewed entered teaching, was of higher status than today. On the other hand, 'conventional wisdom' would support the view that England is a more 'class conscious' country than either of the other two, and thus improving one's status by entering a profession may be more difficult in England.

While English teachers were more likely to report that they had a realistic view of teaching prior to entering teacher training, in all three countries only a minority of respondents believed that their training adequately prepared them for teaching, a finding lending support to the general concern over the efficacy of teacher preparation programs. However, it also appears something of a 'rite of passage' for practising teachers to down play the value of their training and to be critical of the application of pre-service 'theory' to practice. Previous studies have shown that 'real' teaching is where many teachers believe they require the necessary skills and experiences to undertake the role (Dinham, 1992; 1997).

Overall, New Zealand teachers were more likely to rate themselves as satisfied with teaching, and to have experienced less of a decline in satisfaction since beginning teaching than teachers in the other two countries. An explanation of this finding could be the influence played by the extrinsic factors of educational change, increased workload and the status of teachers. The study did not attempt to measure and compare educational change in the three countries, but again, conventional wisdom would tend to support the view that educational change - and

public criticism of education and teachers - has been greatest in England, less so in Australia, and least in New Zealand, although this is a matter of degree as all three nations have experienced substantial pressure for educational change. Certainly, preliminary analysis of open-ended data from the English teachers reveals a high degree of dissatisfaction with the deleterious effects of matters unique to England such as OFSTED inspections and the publication of schools' 'league tables'.

The issue of the Australian teachers' lower satisfaction with their status than teachers in the other two countries may indicate that the decline in teacher status has been greatest there. If indeed England is more status conscious than Australia, and occupational status more rigidly defined and thus less changeable, one might expect the status of teachers to 'hold up' better in England than in Australia. In regards to New Zealand, where teachers were less dissatisfied with their status than in the other two countries, this may reflect less community dissatisfaction with and public criticism of education and teachers, but this matter needs further exploration. The fact remains that workload/change and teacher status were the two scales where teachers in all three countries rated their dissatisfaction highest.

The finding that Australian teachers were least satisfied with promotion procedures than teachers in the other two countries is quite possibly contextual. Over the past ten years or more, there have been varying attempts to introduce 'merit' based promotion and local hiring in the NSW DSE/DET. A series of studies (Dinham, 1992; 1997; Dinham & Scott, 1996b) have revealed a high degree of teacher dissatisfaction with the implementation of various merit based promotion and appointment procedures, so much so that the whole issue is currently under review.

However, in considering some of the possible differences between teachers and school executive in the three countries, it must be said that the possible influence of individual contextual differences is far overshadowed by the commonalities in teacher satisfaction, orientation and commitment revealed by the three related studies.

CONCLUDING REMARKS

The study has confirmed that teachers and school executive surveyed in the three countries want to perform what they perceive to be the central part of their role - the facilitation of pupil achievement - something they find highly satisfying.

However, it is also apparent that school teaching staff are increasingly feeling inadequate and over burdened in the face of the rising expectations and greater responsibilities being placed upon them. Commensurate with this situation is the perception that the general community does not value or appreciate - in both senses of the word - what teachers and schools do, something reflected in the poor way teachers in all three countries believe they are regarded by society. At the same time however, it is also apparent that teachers feel that there has been an unreasonable shift of society's and the family's responsibilities to schools.

It is equally clear that the increased politicisation of education and the increasing pressure for and rate of educational change have been problematic for teachers and school executive.

It is unrealistic to believe that the clock can be turned back to a time when things were easier and simpler for teachers and schools, and, in any case, there never was a 'golden age' in education. Teaching has always been a challenging occupation.

What does need to be done, however, is for all those involved and concerned with education to rethink and agree on what they expect of teachers and schools today,

and in the future, and to provide the support needed, both material and moral, to ensure that these expectations have the best chance of being achieved. 'Teacher bashing' and talk of education being in 'crisis' in the media and community does little to aid in this process, nor does continuous pressure for change and the ongoing restructuring of educational systems.

REFERENCES

Dinham, S. (1992). 'Human Perspectives on the Resignation of Teachers From the New South Wales Public School System: Towards a Model of Teacher Persistence', unpublished PhD thesis, University of New England, Armidale, Australia.

Dinham, S. (1996). "*In Loco Grandparentis*?: The Challenge of Australia's Ageing Teacher Population", *International Studies in Educational Administration*, 24(1), pp. 16-30.

Dinham, S. (1997). 'Teaching and Teachers' Families', *Australian Educational Researcher*, AARE, August, 24(2), pp. 59-88.

Dinham, S. & Scott, C. (1996a). 'Teacher Satisfaction, Motivation and Health: Phase One of the Teacher 2000 Project', paper presented to the annual meeting of the American Educational Research Association, New York, NY, April.

Dinham, S. & Scott, C. (1996b). *The Teacher 2000 Project: A Study of Teacher Satisfaction, Motivation and Health*. Sydney: University of Western Sydney, Nepean.

Dinham, S. & Scott, C. (1997a). 'Modelling Teacher Satisfaction: Findings From 892 Teaching Staff At 71 Schools', paper presented to the American Educational Research Association Annual Meeting, Chicago, March.

Dinham, S. & Scott, C. (1997b). 'The Advanced Skills Teacher: An Opportunity Missed?', *Unicorn*, Australian College of Education, November, 23(3), pp. 36-49.

Dinham, S. & Scott, C. (1998). 'A Three Domain Model of Teacher and School Executive Satisfaction', *Journal of Educational Administration*, 36(4), [in press].

Herzberg, F.; Mausner, B. & Snyderman, B. (1959). *The Motivation to Work*. New York: John Wiley & Sons.

Johnson, J.; Stewart, W.; Hall, E.; Fredlund, P.; & Theorell, T. (1996). 'Long-Term Psychosocial Work Environment and Cardiovascular Mortality Among Swedish Men', *American Journal of Public Health*, 86(3), pp. 324-331.

Logan, L.; Dempster, N.; Berkeley, G.; Chant, D.; Howell, M. & Warry, M. (1990). *Teachers in Australian Schools: A 1989 Profile*. Deakin, ACT: Australian College of Education.

Novacek, J. & Lazarus, R.S. (1990). 'The Structure of Personal Commitments', *Journal of Personality*, 58(4), pp. 693-715.

Otto, R. (1986). *Teachers Under Stress.* Melbourne: Hill of Content.

Qualitative Solutions and Research Pty Ltd. (1994). *QSR NUDIST.* La Trobe University: QSR.

Sergiovanni T. (1967). 'Factors Which Affect Satisfaction and Dissatisfaction of Teachers', *The Journal of Educational Administration*, 5(1), pp. 66-81.

ACKNOWLEDGMENTS

This paper draws upon the work of three project teams and each team has or will be disseminating the findings for their particular study:[4]

New Zealand, Massey University: Richard Harker, Colin Gibbs, Kama Weir, Heather Ryan, David Adams (Okato College, Taranaki)

England, Nottingham-Trent University: Catherine Scott, Sue Cox

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[4] Researchers interested in conducting a replication of the study are encouraged to contact the co-directors of the Teacher 2000 Project, Steve Dinham and Catherine Scott.